

FIBROBLAST GROWTH FACTOR RECEPTORS AND METHODS FOR THEIR USE

Abstract of the Disclosure

Isolated fibroblast growth factor receptor (FGFR5) polypeptides and polynucleotides encoding such polypeptides are provided. Also provided are modulators of FGFR5 gene expression and binding molecules that specifically bind to and agonize or antagonize FGFR5 polypeptide function. Specific binding molecules include antibodies, functional fragments thereof, as well as scFv and *Camelidae* heavy chain IgG that specifically bind to FGFR5 thereby modulating the activity of FGFR5 and, thus, are effective agents suitable for the treatment of diseases such as osteopontin-mediated autoimmune disease, such as systemic lupus erythematosus, bone disorders including osteoporosis and osteopetrosis, and cancers, including cellular carcinomas such as hepatocellular carcinomas.